

51. "*A List of the Beetles of Ireland*," by Rev. W. F. Johnson and J. N. Halbert. (Review.)
Ent. Rec. **14.** 251 (1902.)
52. "*Dibolia cynoglossi*, Koch, a British Insect."
Ent. Rec. **14.** 265 (1902.)
53. "*Quedius obliteratus*, Er."
Ent. Rec. **14.** 266 (1902.)
54. "*Dorcatoma chrysomelina*, Sturm., etc., in Leicestershire."
Ent. Rec. **14.** 267 (1902.)
55. "*Larinus carlinae*, Ol., and other Coleoptera in the Hastings District."
Ent. Rec. **14.** 268 (1902.)
56. "*Quedius cruentus* var. *virens*, Rottbg."
Ent. Rec. **14.** 297 (1902.)
57. "Coleoptera of South Kerry."
Irish Nat. **12.** 59-65 (1903.)
58. "*Quedius obliteratus*, Er., and *Quedius suturalis*, Kies."
Ent. Rec. **15.** 17 (1903.)
59. "Capture of *Meloë brevicollis*, Pz., and *M. cicatricosus*, Leach in April, 1903."
Ent. Rec. **15.** 152 (1903.)
60. "*Monohamus titillator*, F., and *Cerambyx heros*, Scop., taken alive in England."
Ent. Rec. **15.** 153 (1903.)

(To be continued.)

Some Observations on Dr. R. Verity's recent Article on Palaearctic Grypcera.

By B. C. S. WARREN, F.E.S.

In the April and May numbers of this Magazine, Dr. Verity describes numerous new races of various species of the genus *Hesperia*. A few further notes on his article, however, seem to be necessary, as some of the statements in it are not quite in agreement with the facts recorded by general observations, or the data I have collected on the subject, from many sources.

I do not propose, at present, to discuss the many points in connection with Dr. Verity's new races, which would seem to call for notice; but merely to draw attention to those which are actually incorrect, and which would become a source of future trouble if they were left as they stand. To ensure that I have understood Dr. Verity's notes correctly, I have corresponded with him on the subject, and am much obliged to him for his detailed answers, which have thrown much light on some rather puzzling points in his descriptions.

Hesperia alveus.—Dr. Verity describes three races of this species. It is with two of them, his *accreta* and *centralhispaniae*, that I am at present concerned. I was particularly interested in these two subspecies, having eighteen months ago, illustrated, and drawn up detailed descriptions of them, in the preparation of a monograph of the European *Hesperia*.

He applies the name *accreta*, to the magnificent subspecies of the

Pyrenees, but later states that *accrета* spreads to central Spain and occurs there with the form he names *centralhispaniæ*. This is obscuring the true position. Spanish *alveus* does not constitute two distinct races. There is one subspecies occurring all over Spain, and one in the Pyrenees, the former very variable, the latter very constant (in its superficial facies). Dr. Verity, under the impression that *numida* (which is confined to Africa) occurred in Andalusia, did not recognise that Spanish *alveus* is distributed all over Spain, from Andalusia to the Pyrenees, and that the two forms he knew occurring together in central Spain were only the two extremes of one and the same subspecies, which is distinctly different from the Pyrenean subspecies. Of course certain specimens of either subspecies can approach the other closely, which is a common occurrence among all forms of Hesperids. Dr. Verity's *accrета* has to be restricted to the Pyrenees, his "types" coming from Gédre. This leaves his *centralhispaniæ* to cover the Spanish subspecies. In his description of *centralhispaniæ* he states that the underside of the hindwing is a "very pale green." This, doubtless, is because Dr. Verity, in giving two names to these Spanish *alveus*, took the extreme colour, as opposed to the brightish yellow of his *accrета*, for the type of *centralhispaniæ*. As a matter of fact, it is impossible to define two such forms in Spanish *alveus*, for the ground colour of the underside of the hindwing is so variable that the two extremes could be connected by imperceptible degrees. One could not say where one shade of colour ended and the other began. It must be remembered also that this ground colour is of very uneven density, and mottled lighter and darker, not at all like the even coloration of Central European *alveus*, or even Pyrenean *alveus*. The most usual form is a pale yellowish-buff shade (somewhat like, but paler than, the colour typical of *H. carthami*). This varies to buff, and a fairly bright yellow (resembling *accrета* of the Pyrenees), or becomes a little paler, passing from a yellowish-white with a grey look, to a greenish-white (*centralhispaniæ*). All these grades probably occur together, but the yellowish-white shades seem to be the most usual; and I should say the true greenish tinge was more aberrational than racial. In spite of the somewhat misleading statement in regard to colour, in the original description, it is best to accept "*centralhispaniæ*" as covering the whole Spanish form of the insect; rather than restrict it literally to the green-tinged aberrations, and put forward another name for the insect in general. Such a course would obscure the common entity of all Spanish *alveus*, as would the addition of another name for the brightest yellow specimens which Dr. Verity took for *accrета*.

All forms of *centralhispaniæ* resemble *H. carthami* to a greater or lesser extent, especially in the features of the hindwing; *i.e.*, the great extent of clear white on the upperside; and on the underside, the mottled ground colour, the more or less strong outlining in a dark shade, of the white markings; and the markings at the anal angle. The Pyrenean subspecies is very suggestive of *foulquieri*, and in consequence differs in many features from the *carthami*-like Spanish insects; being also usually the larger of the two. It is interesting to note that the largest *centralhispaniæ* come from the South of the country, and some of the smallest from quite the North. In both cases I have known collectors mistake specimens of these two subspecies for the two previously mentioned species.

I must add that Dr. Verity is mistaken in saying that the ♀s of *accreta* do not, on the whole, correspond with the ♂s; he probably had no great number of the ♀s to judge from. Normally the ♀s agree perfectly with the ♂s in all respects. Typical *alveus* occurs in the lower levels of the Pyrenees, but *accreta* replaces it entirely in the higher zones, probably from about 3000 ft. There are many points of great interest attaching to this Pyrenean form, especially regarding anatomical questions, but these cannot be entered into here; I only want to prevent its being confused with other forms of *alveus*; and equally to establish the fact that *centralhispaniae* stands for one, variable subspecies, occurring all over Spain.

H. alveus race *ryffeleusis*.—There remains little doubt that *ryffeleusis* is not a distinct species, but merely a race of *alveus*. All recent work seems to point to this conclusion. It is, however, a remarkable race, and by no means of frequent occurrence in the Alps, many specimens are called *ryffeleusis*, which have no real claim to the name. This is because of the unfortunate fact, that Oberthür's figures (*Lepidop. Comp.*, Vol. IV., p. liv., figs. 470-471) through some mistake, are not *ryffeleusis*! His other figures (Vol. VII., pl. excii., figs. 1859-64) are better, but some are decided transitions to *alveus* (figs. 1860-63). I have verified the above statements by having been able to examine and photograph some of Mous. Oberthür's own specimens of *ryffeleusis*, which were kindly lent to me by Prof. Reyerdin. The photographs will I hope be published later.

In true *ryffeleusis*, the characteristic reduction of the white markings is as great on the underside as on the upper, which gives the insect a remarkable and readily recognised appearance, which is very striking on the underside. Many supposed *ryffeleusis* are only small *alveus* with reduced markings on the upperside, and normal or almost normal markings, on the underside. To this category belongs *alticola*, Rebel, from the Stifserjoek, which were referred to by Dr. Verity. I have seen many of these small Stelvio specimens in collections (there are some in the British Museum collection), and they are not true *ryffeleusis*; indeed to my mind they are not worthy of a name, as there is no definable difference between them and *alveus*, the reduction both in size and markings having no constant development. Such specimens occur in every alpine locality where *alveus* is found. True *ryffeleusis* however, so far as is known, is a decidedly local insect in the Alps: the name remains unaffected by Prof. Rebel's name.

H. foulquieri.—In connection with *ryffeleusis*. Dr. Verity mentions a specimen of *bellieri*, which he says he captured on the Ortler. This record is based on Oberthür's record of the capture of *bellieri* at Zermatt. There is no doubt that this record of Oberthür's is a mistake of identification, and that neither *foulquieri* nor its form *bellieri* are found anywhere in Switzerland. Aberrations of *alveus* are, however, often found, which are so similar to *foulquieri* that they could easily be mistaken for it. Considering this, it seems probable, on account of the locality, that Dr. Verity's *bellieri* from the Ortler may only be a similar aberration.

H. fritillum.—Dr. Verity describes two forms of this insect, as being two broods. So far as all authentic records go, *fritillum* is a single-brooded species; occurring from mid-July to September according to the locality. Dr. Verity tells me that he described these forms because

Sig. Querci had seen some specimens of Oberthür's race *herrichii* and concluded they were the first brood, and that because he did not capture *fritillum* last year at Albarracin until mid-July (having arrived there in June), he assumed, without further proof, that the July specimens must be the second brood! So far only two authentic May *fritillum* are known; they were taken at Digne by V. Cott. The latter, however, never found any more, all other May specimens which I have had the chance to examine have proved to be some other species! I may add that the *herrichii* form occurs at Digne, and in the other localities, in August, with the type.

Without considering in detail the races of *fritillum* which Dr. Verity mentions, I may say that all the Spanish specimens which I have seen, belong to *iberica*, Gr.-Gr. Oberthür's *fabressei*, a slightly less deeply coloured form, might apply to those specimens which occur in southern France and which might be called transitions to *iberica*. I should, however, merely consider them as aberrations.

NOTES ON COLLECTING, etc.

The following record might be worth publishing. I observed *Polygonia c-album* in my garden here, two days ago, August 11th. I first noticed it flying round the garden, and it then settled on the garden hedge and allowed me to approach within a foot or two of it.—J. C. WOODWARD (Commander R.N.), Training Ship Cornwall, Purfleet, Essex.

CURRENT NOTES AND SHORT NOTICES.

Two Meetings of the Entomological Club were held at Oxford during the week-end July 4th to July 6th. Glorious weather prevailed and Oxford was looking at its best.

The Members present were Professor E. B. Poulton, F.R.S., Dr. Harry Eltringham, F.Z.S., Messrs. Robt. Adkin, F.E.S., Jas. E. Collin, F.E.S., Horace Donisthorpe, F.E.S., and H. Willoughby-Ellis, F.E.S.

The guests were Dr. F. A. Dixey, F.R.S., Dr. J. W. Munro, F.E.S., Dr. Guy A. K. Marshall, C.M.G., Commander J. J. Walker, F.E.S., Dr. R. Hanitsch, Messrs. E. Bolton-King, F.E.S., E. B. Ford, F.E.S., Hy. J. Turner, F.E.S., E. G. R. Waters, F.E.S., A. W. Pickard-Cambridge, F.E.S., W. J. Kaye, F.E.S., and W. H. T. Tams, F.E.S.

Accommodation was provided at Wykeham House, the residence of Professor E. B. Poulton, and in rooms in Wadham College by kind permission of the Bursar. The Members and Visitors met at the Hope Department, University Museum, during the afternoon of July 4th, and the collections were inspected and tea was dispensed by Mrs. Poulton in the new Annexe. A meeting of the Club was held at Jesus College in the evening, Professor E. B. Poulton, F.R.S., in the Chair. Members and visitors were entertained to dinner in the Hall of the College at 8 o'clock and a most enjoyable evening was spent. On July 5th, the Hope Department was again open for inspection, while some availed themselves of the opportunity to visit interesting places in Oxford. A collecting excursion was organised and joined by several of the party. Luncheon was provided at Wykeham House and Wadham College, after which the whole of the party joined in a